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Willow Cottage Herne Lane Rustington BN16 3EE		Ferringham Lane Geocell			
Date 7 April 2022 File Geocell calcs 10yr.SRCX		Designed by RTFC Checked by			
Micro Drainage		Source Control 2016.1			
Summary of Results for 10 year Return Period (+40%)					
Half Drain Time : 1397 minutes.					
Storm Event	Max Level (m)	Max Depth (m)	Max Infiltration (l/s)	Max Volume (m³)	Status
15 min Winter	4.975	0.075	0.0	0.4	O K
30 min Winter	4.998	0.098	0.0	0.6	O K
60 min Winter	5.024	0.124	0.0	0.7	O K
120 min Winter	5.051	0.151	0.0	0.9	O K
180 min Winter	5.068	0.168	0.0	1.0	O K
240 min Winter	5.079	0.179	0.0	1.0	O K
360 min Winter	5.095	0.195	0.0	1.1	O K
480 min Winter	5.105	0.205	0.0	1.2	O K
600 min Winter	5.112	0.212	0.0	1.2	O K
720 min Winter	5.117	0.217	0.0	1.2	O K
960 min Winter	5.122	0.222	0.0	1.3	O K
1440 min Winter	5.127	0.227	0.0	1.3	O K
2160 min Winter	5.130	0.230	0.0	1.3	O K
2880 min Winter	5.128	0.228	0.0	1.3	O K
4320 min Winter	5.119	0.219	0.0	1.2	O K
5760 min Winter	5.108	0.208	0.0	1.2	O K
7200 min Winter	5.097	0.197	0.0	1.1	O K
8640 min Winter	5.087	0.187	0.0	1.1	O K
10080 min Winter	5.078	0.178	0.0	1.0	O K
Storm Event	Rain (mm/hr)	Flooded Volume (m³)	Time-Peak (mins)		
15 min Winter	76.214	0.0	19		
30 min Winter	50.290	0.0	34		
60 min Winter	31.908	0.0	64		
120 min Winter	19.755	0.0	122		
180 min Winter	14.804	0.0	180		
240 min Winter	12.028	0.0	238		
360 min Winter	8.957	0.0	356		
480 min Winter	7.262	0.0	470		
600 min Winter	6.168	0.0	584		
720 min Winter	5.396	0.0	694		
960 min Winter	4.369	0.0	906		
1440 min Winter	3.241	0.0	1128		
2160 min Winter	2.402	0.0	1584		
2880 min Winter	1.942	0.0	2044		
4320 min Winter	1.437	0.0	2900		
5760 min Winter	1.161	0.0	3752		
7200 min Winter	0.983	0.0	4608		
8640 min Winter	0.859	0.0	5368		
10080 min Winter	0.766	0.0	6160		
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Rainfall Details

Rainfall Model	FSR	Winter Storms	Yes
Return Period (years)	10	Cv (Summer)	0.750
Region	England and Wales	Cv (Winter)	0.750
M5-60 (mm)	19.000	Shortest Storm (mins)	15
Ratio R	0.350	Longest Storm (mins)	10080
Summer Storms	No	Climate Change %	+40

Time Area Diagram

Total Area (ha) 0.003

Time (mins)	Area
From: To:	(ha)
0 4	0.003

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Model Details

Storage is Online Cover Level (m) 5.800

Cellular Storage Structure

Invert Level (m) 4.900 Safety Factor 3.0
 Infiltration Coefficient Base (m/hr) 0.00000 Porosity 0.95
 Infiltration Coefficient Side (m/hr) 0.04936

Depth (m)	Area (m ²)	Inf. Area (m ²)	Depth (m)	Area (m ²)	Inf. Area (m ²)
0.000	6.0	6.0	0.500	0.0	10.0
0.400	6.0	10.0			

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